

CLAIMS

1. A method for displaying a set of data with a virtually dissected anatomical structure, said method comprising:

creating a virtual dissection of the anatomical structure by mapping a first set of data of the anatomical structure to a second set of data of the anatomical structure;

computing a plurality of display index values corresponding to said first set of data;

assigning display attributes to display index values;

mapping said display index values from the first set of data to a third set of data;

organizing said third set of data for display with the virtually dissected anatomical structure.

2. The method of claim 1, wherein the anatomical structure is a colon.

3. The method of claim 1, wherein the display attribute is color.

4. The method of claim 1, further comprising highlighting select display index values according to user input.

5. The method of claim 4, wherein said highlighted select display index values are shape data.

6. The method of claim 4, wherein said highlighted select display index values are fluid data.

7. The method of claim 4, wherein said highlighted select display index

values are contrast enhanced fecal matter data.

8. The method of claim 1, wherein said first set of data is three-dimensional and said second and third sets of data are two-dimensional.

9. A system for displaying a set of data with a virtually dissected anatomical structure, said system comprising:

a virtual dissection unit for creating a virtual dissection of the anatomical structure by mapping a first set of data to a second set of data, wherein the second set of data corresponds to the virtual dissection;

a computation unit for computing display index values corresponding to said first set of data;

an assignment unit for assigning display attributes to said display index values;

a mapping unit for mapping said display index values from a first set of data to a third set of data;

an overlay unit for organizing said third set of data for display with the virtually dissected anatomical structure.

10. The system of claim 9, wherein the anatomical structure is the colon.

11. The system of claim 9, wherein the display attribute is color.

12. The system of claim 9, further comprising highlighting select display index values according to user input.

13. The system of claim 12, wherein said highlighted select display index values are shape data.

14. The system of claim 12, wherein said highlighted select display index values are fluid data.

15. The system of claim 12, wherein said highlighted select display index values are contrast enhanced fecal matter data.

16. The system of claim 9, wherein said first set of data is three-dimensional and said second and third sets of data are two-dimensional.

17. A method for viewing a virtually dissected anatomical structure, said method comprising:

instructing the display of a virtual dissection of an anatomical structure;

selecting various characteristics of the anatomical structure for enhancement;

observing highlighted characteristics and the virtual dissection.

18. The method of claim 17 further comprising displaying said virtual dissection and said display attributes.

19. The method of claim 17, wherein said anatomical structure is a colon.

20. The method of claim 19, wherein said colon has characteristics comprising cup, rut, saddle, ridge, and cap.

21. The method of claim 17, wherein said selected characteristic for enhancement comprises fluid data.

22. The method of claim 17, wherein said selected characteristic for enhancement comprises contrast enhanced fecal matter data.

23. The method of claim 17, wherein said selected characteristic for enhancement comprises shape data.

24. A computer executable program for displaying a set of data on a virtually dissected anatomical structure, said computer executable program comprising:

creating a virtual dissection of the anatomical structure by mapping a first set of data of the anatomical structure to a second set of data of the anatomical structure;

computing a plurality of display index values corresponding to said first set of data;

assigning display attributes to display index values;

mapping said display index values from the first set of data to a third set of data;

organizing said third set of data for display with the virtually dissected anatomical structure.

25. The computer executable program of claim 24, wherein the anatomical structure is a colon.

26. The computer executable program of claim 24, wherein the display attribute is color.

27. The computer executable program of claim 24, further comprising highlighting select display index values according to user input.

28. The computer executable program of claim 27, wherein said highlighted select display index values are shape data.

29. The computer executable program of claim 27, wherein said highlighted select display index values are fluid data.

30. The computer executable program of claim 27, wherein said highlighted select display index values are contrast enhanced fecal matter data.

31. The computer executable program of claim 24, wherein said first set of data is three-dimensional and said second and third sets of data are two-dimensional.